



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/694,038	10/27/2003	Kevin T. O'Dougherty	N95.12-0015	3887
7590 William F. Ryann ATMI, Inc. 7 Commerce Drive Danbury, CT 06810	11/06/2007		EXAMINER PRICE, CRAIG JAMES	
			ART UNIT 3753	PAPER NUMBER
			MAIL DATE 11/06/2007	DELIVERY MODE PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No.	Applicant(s)
	10/694,038	O'DOUGHERTY ET AL.
	Examiner	Art Unit
	Craig Price	3753

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) Responsive to communication(s) filed on 10 October 2007.
 2a) This action is **FINAL**. 2b) This action is non-final.
 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) Claim(s) 1,2,4-14,16-20 and 22-24 is/are pending in the application.
 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
 5) Claim(s) _____ is/are allowed.
 6) Claim(s) 1,2,4-14,16-20 and 22-24 is/are rejected.
 7) Claim(s) _____ is/are objected to.
 8) Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) The specification is objected to by the Examiner.
 10) The drawing(s) filed on 27 December 2003 is/are: a) accepted or b) objected to by the Examiner.
 Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
 Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
 a) All b) Some * c) None of:
 1. Certified copies of the priority documents have been received.
 2. Certified copies of the priority documents have been received in Application No. _____.
 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date _____ | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Continued Examination Under 37 CFR 1.114

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 10/10/2007 has been entered.

Claim Rejections - 35 USC § 112

2. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

Claims 1,2,4-14,16-20 and 22-24 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention. The limitation "and to permit air in the recirculated fluid to be released from the fluid return channel", is unclear. It is unclear if the air releases above the container through the bore or in the container from the channel? The newly amended limitation "substantially without turbulence" in the independent claims is unclear. It would appear if the fluid is trickling down the channel then there is turbulence. Appropriate correction is required.

Claim Rejections - 35 USC § 103

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).

4. Claims 1,2,4-12,14,16-20 and 22-24 rejected under 35 U.S.C. 103(a) as being unpatentable over Van den Bergen et al. (6,048,113).

Regarding claims 1 and 14, Van den Bergen et al. disclose a liquid dispensing and recirculating system comprising, a container (15) having a mouth (16), a cap (30) for coupling with the mouth, a connector for coupling with the cap (Col.4, Lns.36-39), the connector further comprising, a connector head (28), and a probe (32) extending from the connector head and insertable through the cap and into the mouth, the probe

having a flow passage therein which terminates near a probe tip, a pump (Col. 3, Lns. 14-19) coupled with the probe and with the flow passage for pumping fluid in the container through the probe and the flow passage, and a fluid channel (below 55) extending longitudinally along an exterior of the probe adapted to return recirculated fluid to the fluid in the container such that air in the recirculated fluid is released from the fluid return channel before reaching the fluid in the container to prevent injection of air into the fluid in the container and wherein the fluid return channel is adapted to return the liquid to liquid in the container such that air in the air in the returned liquid is released from the fluid return channel before reaching the liquid in the container to prevent injection of air into the liquid in the container (the air rises to the top of the container as the liquid is entering into the container along the channel) as shown in figure 1.

Regarding claim 2, Van den Bergen et al. disclose that the fluid return channel (below 55) is formed along an exterior of the probe from an area proximate to the connector head to an area proximate to the probe tip as shown in figure 1.

Regarding claim 4, Van den Bergen et al. disclose that the fluid channel has a uniform depth as shown in figure 1.

Regarding claim 5, Van den Bergen et al. disclose that the fluid channel extends along the probe substantially parallel with the flow passage as shown in figure 1.

Regarding claim 6, Van den Bergen et al. disclose that the fluid return channel includes a bore (55) formed at the area proximate to the connector head for delivering the recirculated fluid to the fluid return channel as shown in figure 1.

Regarding claim 7, Van den Bergen et al. disclose that the bore is sized such that recirculated fluid remains within the fluid return channel as it is returned to the container as shown in figure 1.

Regarding claim 8, Van den Bergen et al. disclose that the cap includes a first key element and the connector includes a second key element configured to mate with the first key element (Col. 4, Lns. 55- Col. 5, Lns. 2, the handle and cam mate with surfaces 44 and 45) as shown in figures 1 and 3.

Regarding claims 9-12, Van den Bergen et al. disclose a sensor for sensing when the first and second key elements are mated and for sensing when the first and second key elements are not mated, and wherein the sensor comprises a detector mounted on the connector and a detector affecting element mounted on the cap, the detector mounted on the connector having two states, one state when the first and second key codes are mated and the cap and connector are coupled in a predetermined orientation and a second state when the first and second key codes are not mated and the cap and connector are not coupled in the predetermined orientation and wherein the sensor comprises a detector mounted on the cap and a detector affecting element mounted on the connector, the detector mounted on the cap having two states, one state when the first and second key codes are mated and the cap and connector are coupled in a predetermined orientation and a second state when the first and second key codes are not mated and the cap and connector are not coupled in the predetermined orientation and further comprising, a controller coupled with the sensor and the pump such that the controller enables the pump when the sensor senses that

Art Unit: 3753

the first and second key elements are mated and disables the pump when the sensor senses that the first and second key elements are not mated (Col. 3, Lns. 41-65, and Col. 6, Lns. 7-10).

Regarding claim 16, Van den Bergen et al. disclose that the fluid return channel has a uniform depth as shown in figure 1.

Regarding method claims 17-20 and 22-24 the device shown by Van den Bergen et al. will perform the methods as recited in claims 17-20 and 22-24, during normal operational use of the device, the method of making or using the device is inherent in using the apparatus.

Van den Bergen et al. is silent to the return channel extending longitudinally along and formed on the exterior surface of the probe.

It would have been obvious to one of ordinary skill in the art at the time the invention was made to switch the inlet and return lines of the device of Van den Bergen et al., since it has been held that a mere reversal of essential working parts of a device involves only routine skill in the art.

5. Claim 13 is rejected under 35 U.S.C. 103(a) as being unpatentable over Van den Bergen et al. '113 in view of Priebe et al. (US 2003/0075566).

Van den Bergen et al. has taught all of the features of the claimed invention although is silent to the device having a pressure assist port.

Priebe et al. disclose that the pressure assist port (Figure 4A) that is coupled to an external pressure source for introducing pressurized gas into the container to facilitate flow of the fluid from the container (Page 4, para.0067).

Art Unit: 3753

In view of the Priebe et al. patent, it would have been obvious to one of ordinary skill in the art at the time of invention to employ the external pressure source for introducing pressurized gas into the container to facilitate flow of the fluid from the container of Priebe et al. onto the device of Van den Bergen et al. in order to avoid contamination of the process liquid (para.0065).

Response to Arguments

8. Applicant's arguments with respect to claims 1,2,4-14,16-20 and 22-24 have been considered but are moot in view of the new ground(s) of rejection.

Conclusion

9. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Craig Price whose telephone number is (571) 272-2712. The examiner can normally be reached on 7AM - 5:30PM M-R.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Greg Huson can be reached on (571) 272-4887. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Art Unit: 3753

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

CP



31 October 2007


JOHN RIVELL
PRIMARY EXAMINER
ART UNIT 347